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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/761,522	01/21/2004	Barry P. Mandel	690-011199USPAR/ D/A2423	3428
7590 11/18/2004			EXAMINER	
Joseph V. Gamberdell, Jr. Perman & Green, LLP 425 Post Road Fairfield, CT 06824			GHATT, DAVE A	
			ART UNIT	PAPER NUMBER
			2854	

DATE MAILED: 11/18/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/761,522

Applicant(s)

MANDEL ET AL.

Examiner

Dave A Ghatt

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM
THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 21 January 2004.
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1-6 and 11-18 is/are rejected.
7) ☒ Claim(s) 7-10 is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☒ The drawing(s) filed on 21 January 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 1/21/04 & 3/03/04.
4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, 2, 3, 4, 6, 11, 12, 13, 15, and 18 are rejected under 35 U.S.C. 102(b) as being anticipated by DeAngelis (US 5,547,224). As illustrated in Figure 1, DeAngelis teaches the claimed method and printing system. With respect to claims 1 and 11, Figure 1 of DeAngelis teaches a printing system comprising a plurality of marking engines (22b, 22c, 22d, 22e) for outputting printed media (newsprint paper from rolls NP1, NP2, and NP3) in a stream.

DeAngelis also teaches one finishing station, folder 26, for post processing the printed media. Figure 1 of DeAngelis also teaches a first media path system (shown before and after the nip between rollers 54 and 56) operable to transport the printed media from two or more of the marking engines (22b, 22c, 22d, 22e) to one or more finishing stations 26 such that the streams are merged and transported one on top of the other.

With respect to claims 2 and 12, insofar as structure and method steps are broadly recited, DeAngelis teaches the claimed subject matter. Figure 1 of DeAngelis illustrates one or more media feeder systems (12, 14, 16, 40, 34), and a second path operable to transport the media from any of the media feeder systems, say feed system 16, to any of the plurality of marking engines, say 22C.

With respect to claims 3 and 13, as illustrated in Figure 1, DeAngelis teaches the printed media being output in parallel vertical streams.

With respect to claim 4, the finisher, folder 26, is capable of compiling the media in groups of 2 or more sheets.

With respect to claims 6 and 15, as shown in Figure 1, DeAngelis shows the first media path system further comprising transport drive nip (54, 56) having driven rollers on a top and bottom side of the media stream. Figures 3 and 4 also illustrate a plurality of drive nips.

With respect to claim 11, DeAngelis teaches outputting printed media in multiple streams after leaving printing unit 22, with the media transported one on top the other shown generally at 30, and also at the nip 54, 56.

With respect to claim 18, DeAngelis teaches the method wherein the printing system includes a number of marking systems (22b, 22c, 22d, 22e) and finishing systems folder 26 and interleaver 30, and wherein transporting the printed media comprises routing media from any of the plurality of marking engines, say marking engine 22b, to any of the one or more finishing stations, say folding machine 26, in the event of a failure of a marking engine or finishing station.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1-6 and 11-16 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Terauchi et al. (US 6,474,806) in view of Mandel et al. (US 5,098,074). Terauchi et al. in view of Mandel et al. teach the claimed method and apparatus. With respect to claims 1 and 11, as illustrated in Figure 1, Terauchi et al. teaches a printing system comprising a plurality of marking engines (104a, 104b, 104c, 104d, 104e) for outputting printed media in a stream. Terauchi et al. also teaches a first media path system 105 operable to transport the printed media from two or more of the marking engines to a paper-receiving tray, such that the streams are merged and transported one on top of the other. However, Terauchi et al. does not teach one or more finishing stations for post processing printed media. As outlined in the Abstract, Mandel et al. teaches one or more finishing apparatus 12 for post processing printed paper. In view of this teaching, to one of ordinary skill in the art, it would have been obvious to include in the apparatus of Terauchi et al., one or more finishing stations before feeding the printed media to the paper receiving tray, in order to fasten and collate printed sheets, as taught by Mandel et al. in column 1 lines 13-15.

With respect to claims 2 and 12, insofar as structure and method steps are broadly recited, the primary reference Terauchi et al. teaches the claimed subject matter. Figure 1 of Terauchi et al. illustrates one or more media feed systems 106 and a second path (involving separating claws 201) operable to transport the media from any of the media feed systems 106, say feed system 106, to any of the plurality of marking engines, say 104a.

With respect to claims 3 and 13, as illustrated in Figure 1, the primary reference Terauchi et al. teaches the printed media being output in parallel vertical streams.

With respect to claim 4, Terauchi et al. teaches all the claimed structure except for a finishing apparatus capable of compiling the media into groups. As illustrated in Figure 1B, the finisher 12 of Mandel et al., is capable of compiling the media in groups of 2 or more sheets. In view of this teaching, to one of ordinary skill in the art, it would have been obvious to include in the apparatus of Terauchi et al., one or more finishing stations before feeding the printed media to the paper receiving tray, in order to fasten and collate printed sheets, as taught by Mandel et al. in column 1 lines 13-15.

With respect to claims 5 and 14, Terauchi et al. teaches all the claimed steps and structure except for a tamping machine to be used as finishing apparatus capable of compiling the media into groups. As outlined in column 2 lines 56-60 of Mandel et al., a finisher may include a tamping mechanism 12. In view of this teaching, to one of ordinary skill in the art, it would have been obvious to include in the apparatus of Terauchi et al., a finishing station with a tamping mechanism before feeding the printed media to the paper receiving tray, in order to properly compile printed media, as taught by Mandel et al. in column 2 lines 56-68.

With respect to claims 6 and 15, as shown in Figure 1, Terauchi et al. shows the first media path system further comprising transport drive nip (54, 56) having driven rollers on a top and bottom side of the media stream. Figures 3 and 4 also illustrate a plurality of drive nips.

With respect to claim 11, the primary reference Terauchi et al. teaches outputting printed media in multiple streams after leaving printing units 104, with the media transported one on top the other along delivery system 105.

With respect to claim 16, Terauchi et al. teaches all the claimed steps except for the step of selectively stacking or compiling media in groups of variable numbers of sheets. As outlined

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in column 2 lines 41-68 of Mandel et al., finishers may selectively stack or compile variable numbers of sheets. In view of this teaching, to one of ordinary skill in the art, it would have been obvious to include in the apparatus of Terauchi et al., a finishing station that stacks or compiles as taught by Mandel et al., in order to provide improved post processing capabilities, as taught by Mandel et al. in column 3 lines 1-14.

With respect to claim 18, the primary reference Terauchi et al. teaches the method wherein the printing system includes a number of marking systems (104a, 104b, 104c, 104d, 104e) and finishing systems (stapling system, tamping station as taught in column 2 lines 41-68), and wherein transporting the printed media comprises routing media from any of the plurality of marking engines, say marking engine 104b, to any of the one or more finishing stations, say the stapling machine 26, in the event of a failure of a marking engine or finishing station.

5. Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Terauchi et al. (US 6,474,806) in view of Mandel et al. (US 5,098,074) as applied to claim 11 above, and further in view of Ota et al. (US 6,785,013) . As outlined in the above rejection, Terauchi et al. in view of Mandel et al. teach all the claimed subject matter, except for the step of temporarily buffering the media. Ota et al. teaches a printing method similar to that of Terauchi et al. and Mandel et al. As outlined in column 14 lines 51-67, Ota et al. teaches a memory device that provides the function of temporarily buffering the media, as broadly recited in the claim language. To one of ordinary skill in the art, it would have been obvious to include the step of buffering, as taught by Ota et al., in the method of Terauchi et al. and Mandel et al., in order to correct the rate of printing, as taught by Ota et al., in column 14 lines 51-67.

Allowable Subject Matter

6. Claims 7-10 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claim 7 is indicated as having allowable subject matter because the prior art of record does not teach or render obvious the total apparatus claimed, including a third path section that merges into and out of the first and second path sections such that media traveling along any of the first, second, or third path section may be routed to any other of the first, second, or third path sections.

Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dave A Ghatt whose telephone number is (571) 272-2165. The examiner can normally be reached on Mondays through Friday 8:00 AM to 5:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew H Hirshfeld can be reached on (571) 272-2168. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

DAG



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